

INTERNATIONAL SEARCH REPORT

National Application No

PCT/GB 03/03738

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 G01B21/20 G01B5/20 G01B7/28 G01B11/24

According to International Patent Classification (IPC) or to both national classification and IPC.

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 G01B

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, PAJ, WPI Data

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	US 5 733 126 A (TOERNQUIST ANDERS ET AL) 31 March 1998 (1998-03-31)	1-14
X	column 4 - column 6	15
Y	US 2002/013918 A1 (SWOBODA GARY L ET AL) 31 January 2002 (2002-01-31)	1-14
	column 21 - column 35	
A	US 3 345 613 A (BUCHOLTZ DANIEL J ET AL) 3 October 1967 (1967-10-03)	1-14
	column 18 - column 39	
A	US 5 402 462 A (NOBUTA YASUO) 28 March 1995 (1995-03-28)	1-15
	column 3 - column 11	
	-/-	

☒ Further documents are listed in the continuation of box C.☒ Patent family members are listed in annex.

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Date of the actual completion of the international search

23 November 2004

Date of mailing of the international search report

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INTERNATIONAL SEARCH REPORT

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PCT/GB 03/03738

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 4 692 603 A (ROTH G THOMAS ET AL) 8 September 1987 (1987-09-08) column 20 - column 25	1-15
A	US 5 377 011 A (KOCH STEPHEN K) 27 December 1994 (1994-12-27) claims 1-52	1-15
A	EP 0 565 738 A (SYMBOL TECHNOLOGIES INC) 20 October 1993 (1993-10-20) column 8 - column 23	1
A	EP 0 357 190 A (TOKYO ELECTRIC CO LTD) 7 March 1990 (1990-03-07) column 6 - column 10	1-15
A	US 4 342 050 A (TRAINO JAMES C) 27 July 1982 (1982-07-27) claims 1-13	1, 15
A	US 5 088 046 A (MCMURTRY DAVID R) 11 February 1992 (1992-02-11) column 2 - column 5	1-15

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/GB 03/03738

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
US 5733126	A	31-03-1998	SE 501410 C2 AT 176753 T CA 2127738 A1 DE 69416548 D1 DE 69416548 T2 DK 634150 T3 EP 0634150 A1 ES 2127368 T3 GR 3029970 T3 JP 7143998 A SE 9302400 A US 5607305 A	06-02-1995 15-03-1999 13-01-1995 25-03-1999 08-07-1999 20-09-1999 18-01-1995 16-04-1999 30-07-1999 06-06-1995 13-01-1995 04-03-1997
US 2002013918	A1	31-01-2002	US 6349392 B1 US 4860290 A US 6085336 A US 2003200425 A1 JP 1140335 A US 5329471 A US 6546505 B1 US 6704895 B1 US 5535331 A US 6032268 A US 5684721 A JP 1079834 A JP 2868213 B2 US 5173904 A EP 0411904 A2 JP 3148732 A	19-02-2002 22-08-1989 04-07-2000 23-10-2003 01-06-1989 12-07-1994 08-04-2003 09-03-2004 09-07-1996 29-02-2000 04-11-1997 24-03-1989 10-03-1999 22-12-1992 06-02-1991 25-06-1991
US 3345613	A	03-10-1967	NONE	
US 5402462	A	28-03-1995	JP 5208004 A	20-08-1993
US 4692603	A	08-09-1987	AU 576722 B2 AU 5586986 A BE 905676 A1 CA 1252888 A1 CN 86103142 A ,B DK 577386 A EP 0218634 A1 FI 864910 A IN 168021 A1 JP 62502431 T NO 863885 A SE 8604764 A WO 8605902 A1 ZA 8601762 A	01-09-1988 23-10-1986 16-02-1987 18-04-1989 10-06-1987 01-12-1986 22-04-1987 01-12-1986 26-01-1991 17-09-1987 09-10-1986 06-11-1986 09-10-1986 29-10-1986
US 5377011	A	27-12-1994	US 5231470 A US 5218427 A	27-07-1993 08-06-1993
EP 0565738	A	20-10-1993	US 5304786 A US 5113445 A US 5243655 A AU 637409 B2 AU 6392390 A CA 2026387 A1	19-04-1994 12-05-1992 07-09-1993 27-05-1993 09-10-1990 06-07-1991

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/GB 03/03738

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
EP 0565738	A	DE 69027762 D1	14-08-1996
		DE 69027762 T2	09-01-1997
		DE 69033063 D1	20-05-1999
		DE 69033063 T2	05-08-1999
		EP 0439682 A2	07-08-1991
		EP 0565738 A1	20-10-1993
		EP 0733991 A2	25-09-1996
		JP 2846442 B2	13-01-1999
		JP 3204793 A	06-09-1991
		US 5506697 A	09-04-1996
		US 5399846 A	21-03-1995
		US 5471533 A	28-11-1995
		US 5489158 A	06-02-1996
		US 5635697 A	03-06-1997
		US 5504322 A	02-04-1996
		US 5644408 A	01-07-1997
		US 5710419 A	20-01-1998
		US 5796090 A	18-08-1998
		US 5760382 A	02-06-1998
		US 5837986 A	17-11-1998
		US 5974202 A	26-10-1999
		US 6002491 A	14-12-1999
		US 5337361 A	09-08-1994
		US 5880453 A	09-03-1999
		US 5159635 A	27-10-1992
		US 5646389 A	08-07-1997
		BR 9300173 A	21-09-1993
		ZA 9300242 A	14-02-1994
EP 0357190	A	07-03-1990	
		JP 2063009 A	02-03-1990
		JP 2063847 A	05-03-1990
		JP 2080628 C	09-08-1996
		JP 7121591 B	25-12-1995
		DE 68922046 D1	11-05-1995
		DE 68922046 T2	04-07-1996
		EP 0357190 A2	07-03-1990
		KR 9300022 B1	06-01-1993
		US 4962981 A	16-10-1990
US 4342050	A	27-07-1982	
		DE 3173771 D1	27-03-1986
		EP 0075628 A1	06-04-1983
		JP 57087673 A	01-06-1982
US 5088046	A	11-02-1992	
		DE 3878557 D1	25-03-1993
		DE 3878557 T2	03-06-1993
		EP 0344304 A1	06-12-1989
		WO 8905960 A1	29-06-1989
		JP 2502581 T	16-08-1990
		JP 2648738 B2	03-09-1997
		US 5212646 A	18-05-1993